

A New Sponge Species, *Stelletta kundukensis* (Demospongiae: Stellettidae), from Korea

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ABSTRACT

A new sponge, *Stelletta kundukensis*, is described from the East Sea coast of Korea.

Key words: *Stelletta kundukensis*, n. sp., sponge, Korea.

INTRODUCTION

Over 40 species of genus *Stelletta* were reported all over the world. Twelve species were described from Japan by Thiele (1898) and Hoshino (1981). Ten species were reported from New Zealand by Berquist (1968). Five species were known from Koeran coasts (Sim, 1981; Sim and Kim, 1995). *Stelletta*, with long shafted triaenes of various types accompanied by oxeas as megascleres, differs from other genera in that there are always two distinct categories of euaster as microscleres. This paper deals with the description of a new species collected from Kunduk, East Sea coast of Korea by fish-nets. The specimens are deposited in the Natural History Museum of Han Nam University (NHM).

RESULT

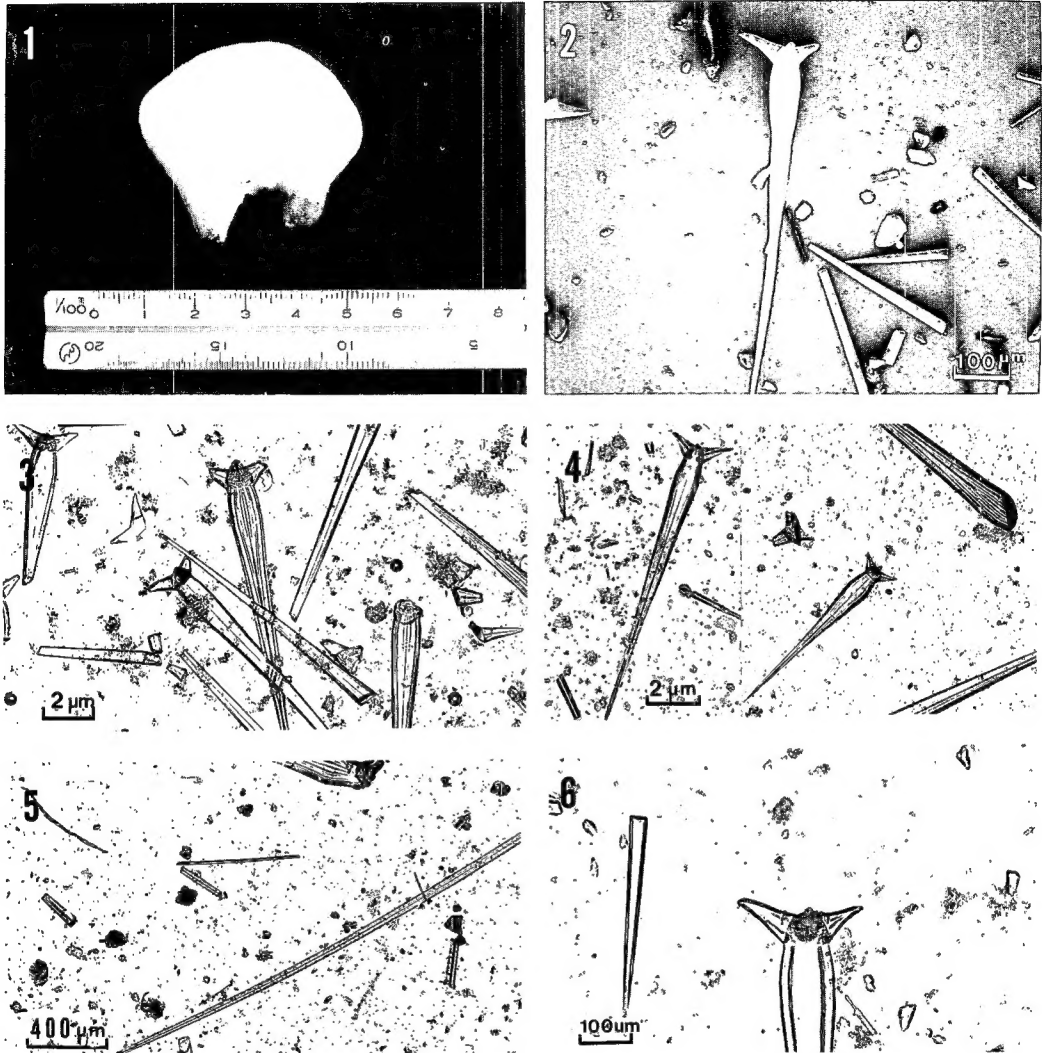
Order Astrophorida Levi, 1973 별해면목

Family Stellettidae Carter, 1875 별해면과

Genus *Stelletta* Schmidt, 1862 별해면속

***Stelletta kundukensis*, n. sp.** 근덕별해면 (신칭) (Figs. 1-8)

Material examined. Holotype Por. 20 (Han Nam Univ. NHM): Kunduk (fish-net) 6/VI/1993.



Figs. 1-6. *Stelletta kundukensis*, n. sp.: 1, entire animal; 2-4, megascleres. 2, plagiotriaene (SEM); 3 and 4, plagiotriaene; 5, oxea; 6, head of plagiotriaene.

Description. Shape: flatten, stony, size up to $45 \times 35 \times 15$ mm.

Surface: smooth, no oscules and pores were observed.

Texture: very hard like stone.

Colour: white.

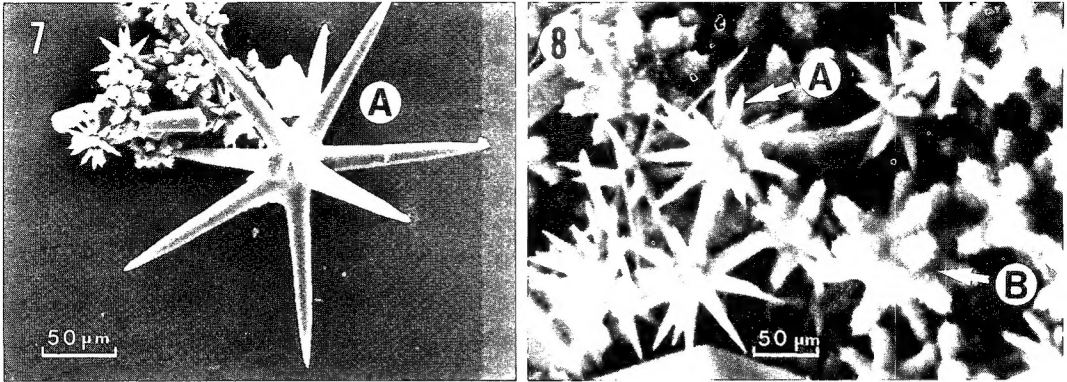
Skeleton: Ectosome, outer layer hard, 1 mm thick with bundle of plagiotriaene, and mixed with stronglyspheraster microscleres. Clads of the plagiotriaene are directed toward the surface, arranged radial skeleton. Choanosome have only oxea as megascleres, oxyaster and oxyspheraster as microscleres, distributed in an irregular fashion.

Spicules: I. Megascleres

(1) Plagiotriaene (long)

Rhabdome $2400 \times 120 \mu\text{m}$

Cladi (individual) $100 \times 80 \mu\text{m}$



Figs. 7-8. *Stelletta kundukensis*, n. sp., microscleres (SEM): 7, oxyaster (A); 8, oxyspheraster (A) and stronglylospheraster (B).

Plagiotriaene (Short)	Rhabdome	600 × 80 µm
	Cladi	50 × 25 µm
(2) Oxea		3500 × 25-50 µm
II. Microscleres		
Oxyaster(6-12rays)		30-70 µm (diameter)
Oxyspheraster		7.5-12.5 µm (diameter)
Strongylospheraster		6-7.5 µm (diameter)

Remarks. *Stelletta kundukensis* is similar to *Stelletta grubii* Schmidt, 1862 (Hoshino, 1981) in its spicules. *S. grubii* has long and thin cladi of plagiotriaene. *S. kundukensis* has short and thick cladi of plagiotriaene and also base rhabdome with club-shaped dilatation. Radial skeleton appears only at the cortical layer.

The plagiotriaene and oxea of the new species are so fragile that it is very hard to find complete spicules. At first glance the type specimen looked like a genus *Geodia* in naked eye.

Etymology. The specific name *kundukensis* is named after the type locality, Kunduk.

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한국 근덕의 해면 1신종(보통해면강: 별해면과)

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요 약

1993년 6월 동해의 근덕에서 어망으로 채집된 해면동물을 동정한 결과 1신종이 밝혀져 *Stelletta kundukensis*로 명명하고 기재하였다.